

# EXHIBIT 4

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571-272-7822

Paper 10  
Date: December 6, 2021

UNITED STATES PATENT AND TRADEMARK OFFICE

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BEFORE THE PATENT TRIAL AND APPEAL BOARD

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APPLE, INC.,  
Petitioner,

v.

GESTURE TECHNOLOGY PARTNERS, LLC,  
Patent Owner.

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IPR2021-00923  
Patent 8,194,924 B2

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Before PATRICK R. SCANLON, GREGG I. ANDERSON, and  
BRENT M. DOUGAL, *Administrative Patent Judges*.

DOUGAL, *Administrative Patent Judge*.

DECISION  
Granting Institution of *Inter Partes* Review  
35 U.S.C. § 314, 37 C.F.R. § 42.4

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## I. INTRODUCTION

### A. *Background and Summary*

Petitioner, Apple Inc., requests that we institute an *inter partes* review to challenge the patentability of claims 1–14 (the “challenged claims”) of U.S. Patent 8,194,924 B2 (Ex. 1001, “the ’924 patent”). Paper 1 (“Petition” or “Pet.”). Patent Owner, Gesture Technology Partners, LLC, argues that Petitioner’s request is deficient and should not be granted. Paper 8 (“Preliminary Response” or “Prelim. Resp.”).

Applying the standard set forth in 35 U.S.C. § 314(a), which requires demonstration of a reasonable likelihood that Petitioner would prevail with respect to at least one challenged claim, we institute an *inter partes* review.<sup>1</sup>

### B. *Related Matters*

The parties identify these related matters: *Gesture Technology Partners, LLC v. Huawei Device Co., Ltd.*, No. 2:21-cv-00040 (E.D. Tex.); *Gesture Technology Partners, LLC v. Samsung Electronics Co.*, No. 2:21-cv-00041 (E.D. Tex.); *Gesture Technology Partners, LLC v. Apple Inc.*, No. 6:21-cv-00121 (W.D. Tex.); *Gesture Technology Partners, LLC v. Lenovo Group Ltd.*, No. 6:21-cv-00122 (W.D. Tex.); and *Gesture Technology Partners, LLC v. LG Electronics, Inc.*, No. 6:21-cv-00123 (W.D. Tex.). Pet. 75; Paper 6, 1. Patent Owner identifies these related Board proceedings: IPR2021-00917; IPR2021-00920; and IPR2021-00922. Paper 6, 2.

### C. *The ’924 Patent*

The ’924 patent is entitled “Camera Based Sensing in Handheld, Mobile, Gaming or Other Devices.” Ex. 1001, code (54). The ’924 patent is

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<sup>1</sup> Our findings and conclusions at this stage are preliminary, and thus, no final determinations are made.

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directed towards methods and apparatuses “to enable rapid TV camera and computer-based sensing in many practical applications, including, but not limited to, handheld devices, cars, and video games.” *Id.* at Abstract.

The '924 patent describes the use of computer devices and one or more cameras that “optically sens[e] human input.” *Id.* at 2:7–11. In general, the '924 patent discloses numerous applications in which a user or an object held by a user can control a computer with one or more cameras as depicted in Figure 1A below.

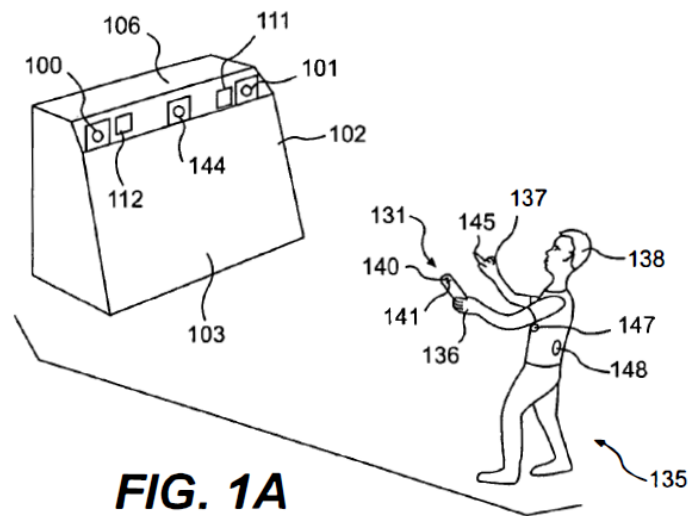


Figure 1A shows “a combination of one or more TV cameras (or other suitable electro-optical sensors) and a computer to provide various position and orientation related functions of use.” *Id.* at 3:19–23. As shown, there are multiple cameras (100, 101, 144) located on a monitor (102) with a screen (103) facing a user and connected to a computer (106). *Id.* at 3:27–57.

The '924 patent discloses a handheld computer with multiple cameras (1902, 1910) depicted in Figure 18 below. *Id.* at 25:40–45.

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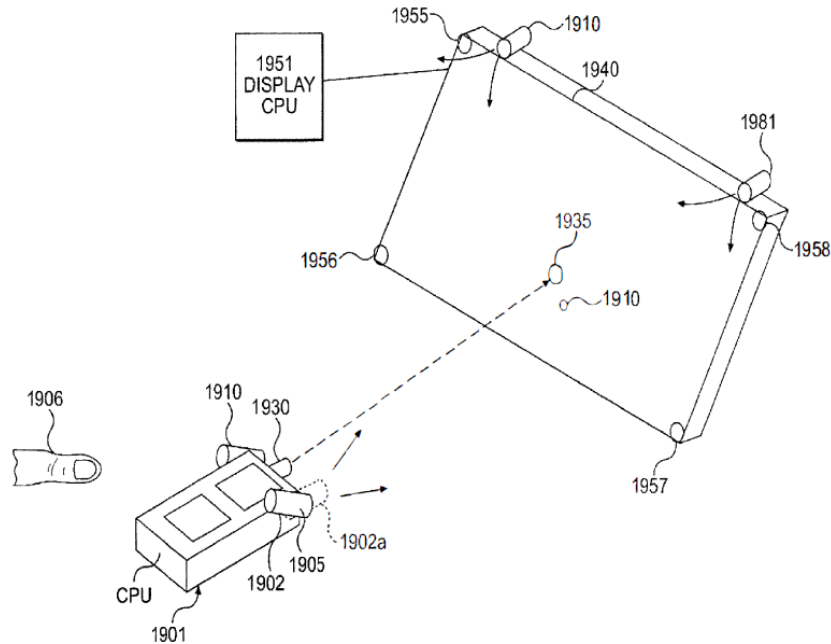


Fig. 18

As illustrated in Figure 18, a handheld computer (1901) with central processing unit (CPU) houses a camera (1902) that can be paired in stereo with another camera (1910), either of which may rotate about an axis to view a user or aspect of that user like a finger (1906). *Id.* at 25:40–43. When aimed at the user, the camera(s) can be used to obtain images and video images of a user’s fingers, hand, objects in the hand, gestures, and facial expressions. *Id.* at 25:50–63. Facing one or more of the cameras away from the user, they “can also be used to see gestures of others.” *Id.* at 26:25.

#### D. Illustrative Claim

Petitioner challenges claims 1–14 of the ’924 patent. Claim 1 is the sole independent claim and is illustrative:

1. A handheld device comprising:
  - a housing;
  - a computer within the housing;

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a first camera oriented to view a user of the handheld device and having a first camera output; and

a second camera oriented to view an object other than the user of the device and having a second camera output, wherein the first and second cameras include non-overlapping fields of view, and wherein the computer is adapted to perform a control function of the handheld device based on at least one of the first camera output and the second camera output.

Ex. 1001, 26:54–65.

## II. ANALYSIS

### *A. Summary of Issues*

In the below analysis, we first address the grounds of unpatentability. We then address Patent Owner’s jurisdiction arguments.

### *B. Grounds of Unpatentability*

Petitioner asserts the following grounds of unpatentability (Pet. 6), supported by the declaration of Benjamin B. Bederson (Ex. 1003):

<b>Claim(s) Challenged</b>	<b>35 U.S.C. §</b>	<b>Reference(s)/Basis</b>
1–6, 11, 14	103(a) <sup>2</sup>	Mann, <sup>3</sup> Numazaki <sup>4</sup>
7, 8, 10, 12, 13	103(a)	Mann, Numazaki, Amir <sup>5</sup>
6, 9	103(a)	Mann, Numazaki, Aviv <sup>6</sup>

<sup>2</sup> The Leahy-Smith America Invents Act (“AIA”), Pub. L. No. 112-29, 125 Stat. 284, 285–88 (2011), revised 35 U.S.C. § 103 effective March 16, 2013. Because the challenged patent claims priority before March 16, 2013, we refer to the pre-AIA versions.

<sup>3</sup> Canadian Published Patent Application 2,237,939, published Aug. 28, 1998 (“Mann”) (Ex. 1004).

<sup>4</sup> U.S. Patent 6,144,366, issued Nov. 7, 2000 (“Numazaki”) (Ex. 1005).

<sup>5</sup> U.S. Patent 6,539,100 B1, issued Mar. 25, 2003 (“Amir”) (Ex. 1006).

<sup>6</sup> U.S. Patent 5,666,157, issued Sept. 9, 1997 (“Aviv”) (Ex. 1007).

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*1. Legal Standards for Unpatentability*

Petitioner bears the burden to demonstrate unpatentability. *Dynamic Drinkware, LLC v. Nat'l Graphics, Inc.*, 800 F.3d 1375, 1378 (Fed. Cir. 2015). At this preliminary stage, we determine whether the information presented in the Petition shows a reasonable likelihood that Petitioner would prevail in establishing that at least one of the challenged claims would have been unpatentable. *See* 35 U.S.C. § 314(a).

A claim is unpatentable as obvious under 35 U.S.C. § 103 if “the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains.” *KSR Int'l Co. v. Teleflex Inc.*, 550 U.S. 398, 406 (2007) (quoting 35 U.S.C. § 103(a)). We resolve the question of obviousness based on underlying factual determinations, including: (1) the scope and content of the prior art; (2) any differences between the prior art and the claims; (3) the level of skill in the art; and (4) when in evidence, objective indicia of nonobviousness. *See Graham v. John Deere Co.*, 383 U.S. 1, 17–18 (1966).

We apply these principles to the Petition’s challenges.

*2. Level of Ordinary Skill in the Art*

Petitioner asserts that “[a] person having ordinary skill in the art (‘PHOSITA’) at the time of the ’924 Patent would have had at least a bachelor’s degree in electrical engineering or equivalent with at least one year of experience in the field of human computer interaction” and that “[a]dditional education or experience might substitute for the above requirements.” Pet. 5 (citing Ex. 1003 ¶¶ 29–31). Patent Owner does not dispute Petitioner’s level of ordinary skill in the art. Prelim. Resp. 5.

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We are persuaded, on the present record, that Petitioner's declarant's statement is consistent with the problems and solutions in the '924 patent and prior art of record. We adopt this definition for the purposes of this Decision.

### 3. *Claim Construction*

In *inter partes* review, we construe claims using the same claim construction standard that would be used to construe the claim in a civil action under 35 U.S.C. § 282(b), including construing the claim in accordance with the ordinary and customary meaning of such claim as understood by one of ordinary skill in the art and the prosecution history pertaining to the patent. 37 C.F.R. § 42.100(b) (2020).

Neither party provides any express claim constructions. *See* Pet. 7; Prelim. Resp. 5. We agree that no terms require express construction at this stage. *See Nidec Motor Corp. v. Zhongshan Broad Ocean Motor Co.*, 868 F.3d 1013, 1017 (Fed. Cir. 2017) (“[W]e need only construe terms that are in controversy, and only to the extent necessary to resolve the controversy.”) (internal quotation omitted).

### 4. *Obviousness over Mann and Numazaki*

Petitioner argues that the combination of Mann and Numazaki would have rendered obvious claims 1–6, 11, and 14. Pet. 7–49. Patent Owner contends that Numazaki does not disclose all the limitations of claim 1. Prelim. Resp. 5–15.

We first give an overview of the asserted prior art, Mann and Numazaki. This is followed by a discussion of Petitioner's positions and Patent Owner's arguments in response where we conclude that Petitioner has demonstrated a reasonable likelihood of prevailing with respect to at least one claim.



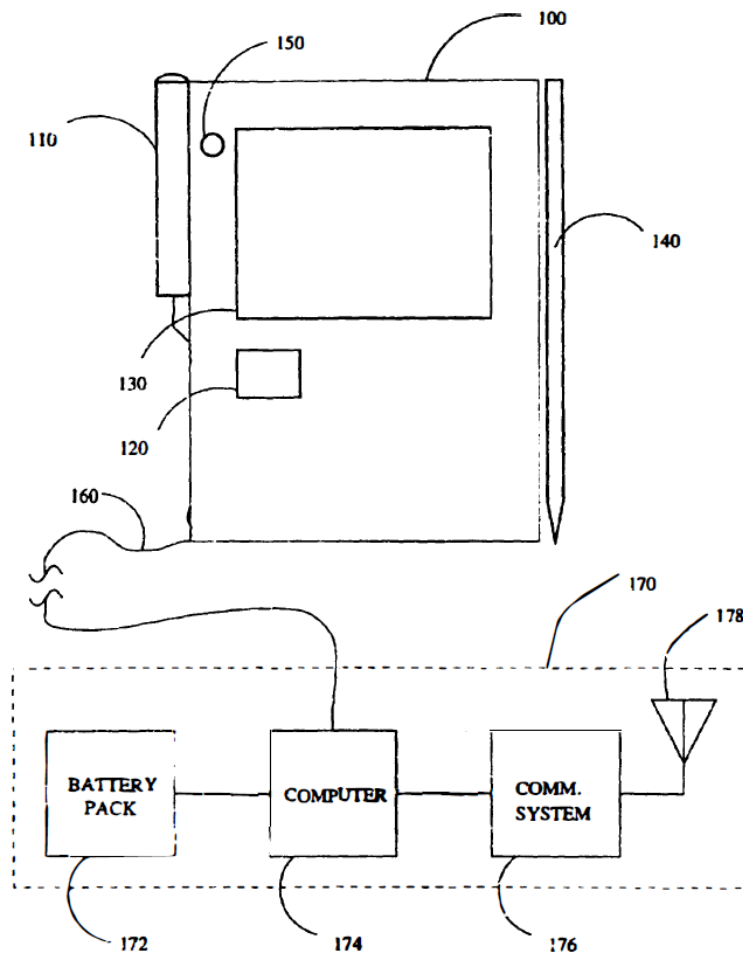
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a) *Mann*

Mann is directed to “a personal camera with viewfinder means and a personal video annotation system.” Ex. 1004, Abstract. Mann states that “[t]he camera system integrates the process of making a personal handwritten diary or the like, with the capture of video.” *Id.*

Figure 1 depicts an embodiment with “a camera borne by a personal digital assistant (PDA).” *Id.* at 10.



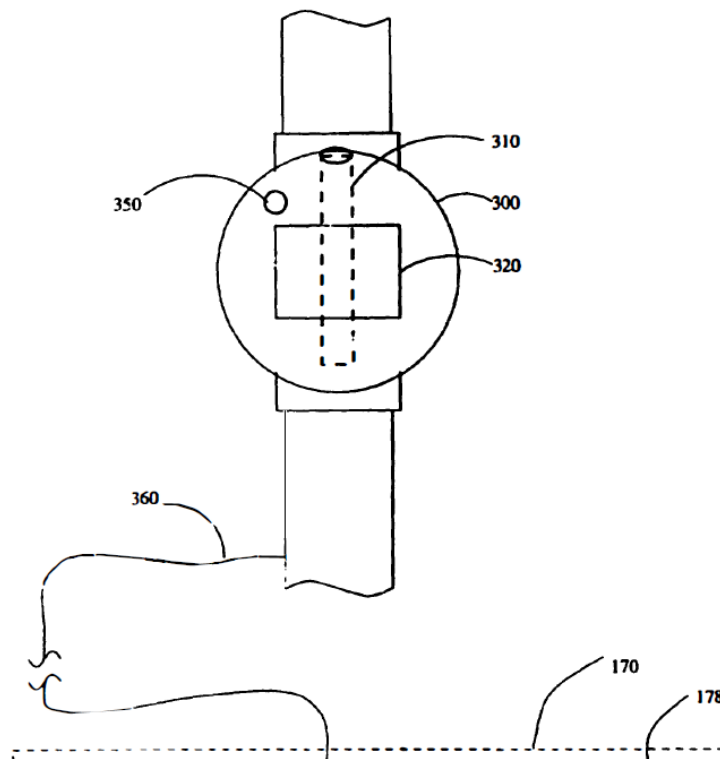
As shown in Figure 1, the PDA includes a video camera (110), an auxiliary screen (120) for displaying the image captured by the video camera, a screen for notetaking (130), and a pen (140). *Id.* at 11–12. Mann teaches that the PDA can optionally include an second camera (150) “if the user wishes to make a video recording of himself/herself while recording another person

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with camera 110,” so as to record “both sides of the conversation.” *Id.* at 12. The PDA is connected, via wire (160) that may “run up the sleeve of the user” to a separate body worn pack (170). *Id.* The body pack includes a battery pack (172), a computer system (174), and a communications system (176). The communications system contains a “packet radio terminal node controller (high level data link controller with modem) and radio, which typically establishes an Internet connection by way of antenna 178.” *Id.*

Mann also teaches a “wristwatch embodiment 300 of the invention depicted in Fig[ure] 1,” which is shown in Figure 3. *Id.* at 13. A detail view of Figure 3 is reproduced below, where the separate body worn pack (170) is not fully depicted, as it is identical to that shown in Figure 1.



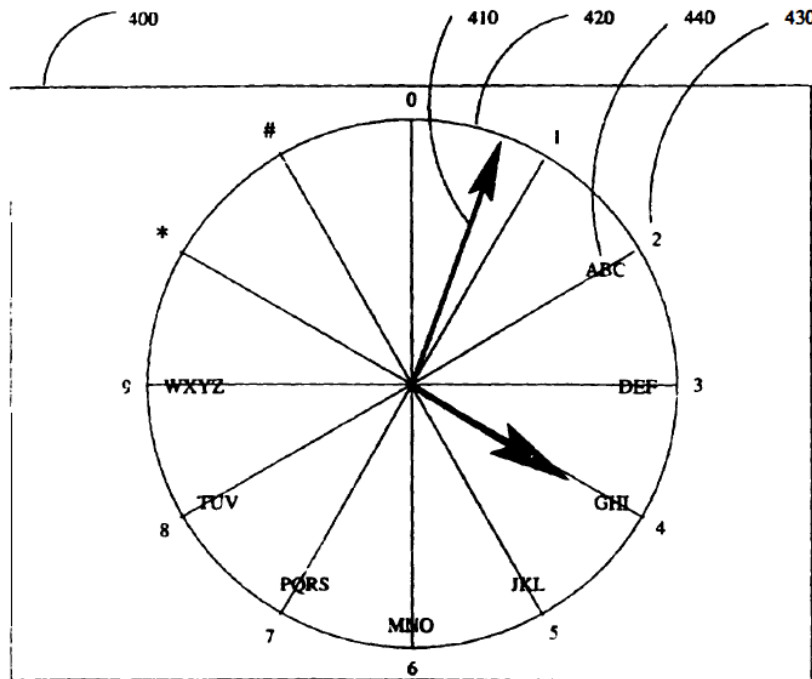
In the detail view of Figure 3 above, a wristwatch (300) is illustrated which houses a first camera (310) pointed to record another person from the wearer and a second camera (350) to record the wristwatch wearer interviewing the other person. *Id.* The wristwatch also includes a viewfinder

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in the form of an auxiliary screen (320) which shows what the first camera is seeing. *Id.* As in the prior embodiment, cabling runs to the separate body worn pack (170) which includes a battery pack (172), a computer system (174), and a communications system (176). In this way the “video from camera 310 may be transmitted and recorded at remote sites, while the wearer of the wristwatch may be advised by a remote legal expert on the best approach for dealing with the corrupt or disrespectful official.” *Id.* at 13–14. Mann teaches that “[i]nteraction with the wristwatch version of the invention . . . may be done through a pen-based or touch-based interface to the screen.” *Id.* at 14.

Figure 4, reproduced below, shows a “display 400 [that] is the image of a clock face, superimposed on top of a video signal from the camera.” *Id.*



As shown, the display (400) includes a circle (420) with numbers (430) in order to tell time. *Id.* “[T]he numbers may be assigned a secondary meaning (e.g., select ‘0’ to stop recording, ‘4’ to kill all processes and halt

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the processor, ‘7’ to wake up the system from sleep mode, etc.).” *Id.* Mann teaches that “[t]he user just needs to stroke the face of the clock in the direction desired (e.g. stroke the clockface in the 2:00 direction to enter the number ‘2’).” *Id.* at 15. Users can enter information like letters, symbols, and numbers such as to create a video file header, or to enter a telephone number. *Id.*

*b) Numazaki*

Numazaki “relates to a method and an apparatus for generating information input in which input information is extracted by obtaining a reflected light image of a target object.” Ex. 1005, 1:8–11.

Figure 1, reproduced below, depicts a block diagram for an information input generation apparatus.

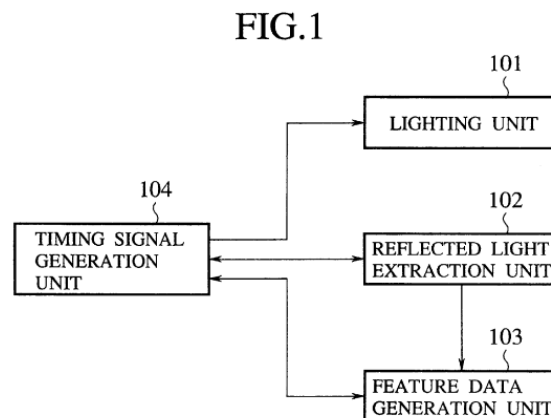


Figure 1 shows that an information input generation apparatus includes a lighting unit (101), a reflected light extraction unit (102), a feature data generation unit (103), and a timing signal generation unit (104). *Id.* at 10:23–28. Numazaki describes emitting light from the light emitting unit (101) and that the intensity of the light varies in time according to a timing signal from the timing signal generation unit (104). *Id.* at 10:29–31. The light is directed onto a target object and light reflected from the target object is extracted by

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the reflected light extraction unit (102). *Id.* at 10:31–35. Numazaki teaches that the feature data generation unit (103) extracts feature data from the reflected light image. *Id.* at 10:57–61. Numazaki further teaches operating a computer based on information obtained from the feature data. *Id.* at 10:61–66.

Figure 78, reproduced below, illustrates an information input generation apparatus.

FIG.78

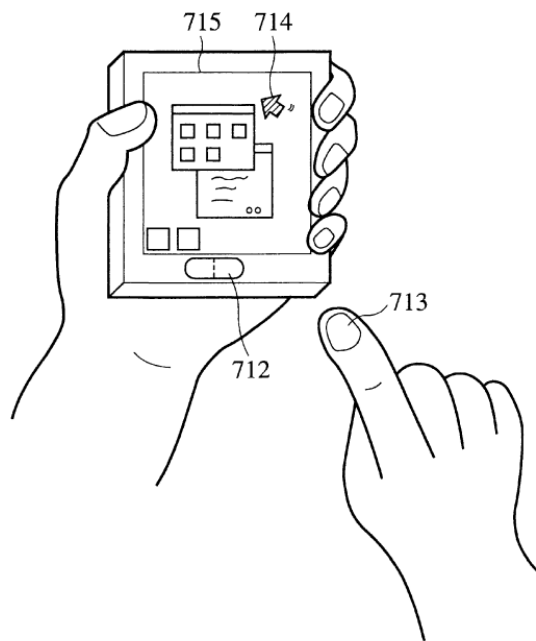


Figure 78 shows “a compact portable information device” having “a size that can be held by one hand.” *Id.* at 52:5–8. The device includes a window (712) for a lighting unit and a photo-detection sensor unit. *Id.* at 52:12–14.

Numazaki describes controlling the position of a cursor (714) on a screen by moving a finger (713) in front of the window (712). *Id.* at 52:14–16.

Numazaki also describes implementing the lighting and camera structure in a wristwatch such that “a cursor 717 can be controlled by

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moving a finger 716” within an “operation space” where “[w]indows 718 and 719 are provided for the lighting unit and the photo-detection sensor unit.” *Id.* at 52:20–29. This arrangement is illustrated in Fig. 79 below:

FIG.79

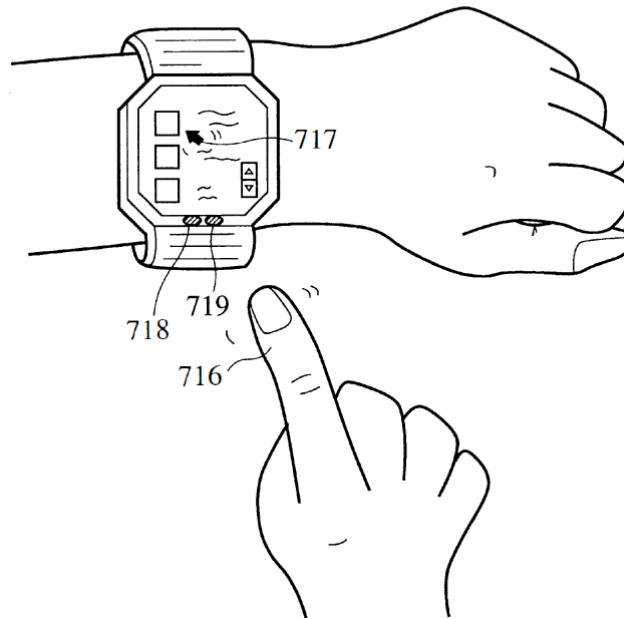


Figure 79 above, shows a wristwatch with a light source (718) and a camera (719) used to track a fingertip gesture to manipulate a cursor (717). *Id.* The windows are positioned on the device so that “it is possible to prevent the operating finger from obstructing the view of the display.” *Id.* at 52:30–32.

*c) Claim 1*

Petitioner relies on two different combinations of Mann and Numazaki for teaching or suggesting all of the elements of claim 1. Pet. 18–42. Petitioner combines the PDA shown in Mann’s Figure 1 with aspects of the compact portable information device shown in Numazaki’s Figure 78. *Id.* Petitioner alternatively combines Mann’s wristwatch shown in Figure 3, with aspects of Numazaki’s wristwatch shown in Figure 79. Petitioner appears to be arguing that though the form factors are different (PDA v.

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wristwatch), the disclosed hardware and functionality are essentially the same. Petitioner further appears to be arguing that, at least with respect to claim 1, either combination satisfies all limitations.

Petitioner argues that both embodiments of Mann disclose a handheld device (*id.* at 25–28 (citing Ex. 1004, 1, 10, 13, Figs. 1, 3)) with a computer within a housing (*id.* at 28–32 (citing Ex. 1004, 3, 11–13, 20–21, Figs. 1, 3)), a first camera having an output and oriented to view a user of the handheld device (*id.* at 33–34 (citing Ex. 1004, 12–13, 18, Figs. 1, 3)), and a second camera having an output and oriented to view an object other than the user and having a non-overlapping field of view with the first camera (*id.* at 34–37 (citing Ex. 1004, 11–12, 18, 21, Figs. 1, 3)), as required by claim 1. Patent Owner does not contest that Mann teaches these claim limitations. *See generally* Prelim. Resp. We determine that Petitioner has adequately shown how Mann teaches each of these claim limitations.

For the final limitation of claim 1, reproduced immediately below, Petitioner relies on the combination of Mann and Numazaki. Pet. 18–25, 38–42. Patent Owner argues that Petitioner has not satisfied its burden with respect to this limitation. We first address the teachings of Mann and Numazaki; this is followed by a discussion of Petitioner’s reasons to combine these two references.

*(1) Adapted to perform a control function*

Claim 1 requires:

wherein the computer is adapted to perform a control function of the handheld device based on at least one of the first camera output and the second camera output.

Ex. 1001, 26:62–65.

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The Petition relies on the combination of Mann and Numazaki for teaching a computer adapted to perform a control function of the handheld device based on the first camera output, which is the camera facing the user. Pet. 18–25, 38–42. The Petition does not address the alternative involving the second camera output. *See id.*; Prelim. Resp. 6.

Petitioner argues that Mann teaches controlling a wristwatch with a touch-based interface and that a PHOSITA would have understood a PDA to have similar controls, “such as through use of the PDA stylus.” Pet. 19–20, 38–39 (citing Ex. 1004 14–15, Fig. 4; Ex. 1003 ¶¶ 36, 45). Petitioner argues that “it would have been obvious to modify Mann such that a user can perform non-touch gestures pursuant to Numazaki’s teachings, rather than the touch gestures/inputs described by Mann.” *Id.* at 39. Petitioner argues that Mann modified by Numazaki in this manner teaches the claimed computer adapted to perform a control function limitation. *Id.* at 38–42.

The Petition relies on Numazaki for teaching a window (712) for “the light source and camera sensor” of the compact portable information device (PDA style device) in Figure 78 “which is used to detect gestures performed by the user such that the ‘position of a cursor 714 on the screen can be controlled by moving a finger 713 in front of this window 712.’” *Id.* at 40 (quoting Ex. 1005, 52:5–16). Petitioner argues that Numazaki’s wristwatch in Figure 79 discloses a similar structure. *Id.* at 40–41.

Numazaki only provides some details about the camera sensor or photo-detection sensor unit. *See generally* Ex. 1005, 50:25–54:6. However, Petitioner relies on Numazaki’s teaching that the light and camera arrangement of Figure 2 is incorporated into the eighth embodiment (which includes both the PDA and wristwatch style designs) for more details about the photo-detection sensor unit. Pet. 41–42; *see also* Ex. 1003 ¶ 42



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(discussing what a PHOSITA would have understood was incorporated into the eighth embodiment). Thus, Petitioner argues that the PDA and wristwatch style designs would include “a timing control unit and difference calculation unit are used to capture reflected light images emanating from a user’s finger and isolate the appearance of the finger from other objects.” Pet. 41 (citing Ex. 1005, 11:20–51). Petitioner further argues that “[t]his information is then used by feature data generation unit 103 to determine gestures, pointing, etc. of the target object that may be converted into commands executed by a computer. *Id.* (citing Ex. 1005, 10:57–66).

Based on these teachings and those further discussed in the Petition, we determine that the Petition sufficiently identifies how the cited art teaches a computer adapted to perform a control function as claimed.

Patent Owner argues that “Numazaki does not teach or suggest ‘wherein the computer is adapted to perform a control function of the handheld device based on’ the first camera output” as required by claim 1. Prelim. Resp. 7. Patent Owner argues that this is because Numazaki’s difference calculation unit compares “two images from different photo-detection units.” *Id.*

Patent Owner does not identify why the claim should be limited to a computer adapted to perform the control function based on the output of only a single photo-detection unit or camera. Here the claim does require that the control function be based on the output of the first camera, but it does not limit the claim to only that output. *See Genentech, Inc. v. Chiron Corp.*, 112 F.3d 495, 501 (Fed. Cir. 1997) (discussing “open ended” claim terms, such as “comprising”). As noted by Patent Owner and Petitioner, Numazaki teaches that the feature data generation unit 103 determines gestures, pointing, etc. based on a comparison between two images. Prelim.

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Resp. 8; Pet. 14–15. Thus, based on the current record, as one of those images is an output of the first camera, the noted limitation of claim 1 is satisfied.

Patent Owner also argues, without further explanation that “Numazaki does not teach or suggest performing a control function of a handheld device absent the other hardware that Numazaki identifies as necessary, such as the lighting unit, the image-subtraction circuitry, and the associated timing circuitry.” Prelim. Resp. 8. This argument fails for the same reason.

However, claim 1 uses the term “comprising” to create an “open ended” claim. “‘Comprising’ is a term of art used in claim language which means that the named elements are essential, but other elements may be added and still form a construct within the scope of the claim.” *Genentech*, 112 F.3d at 501. Thus, the presence of a lighting unit or other hardware is not excluded from the claim.

For the above reasons, Patent Owner’s arguments do not undermine the showing by Petitioner that the combination of Mann and Numazaki teaches a computer adapted to perform a control function as claimed.

*(2) Reason to Combine*

Petitioner provides three reasons to combine the above teachings of Numazaki with Mann. Pet. 20–25. Patent Owner objects to all three. Prelim. Resp. 9–15.

*(a) Success in Modifying*

Petitioner argues that “a [person of ordinary skill in the art] would have anticipated success in modifying Mann’s wristwatch based on similarities in functionality and structure of the computer, cameras, and control functionality taught by Mann and Numazaki.” Pet. 20–21. In support of this argument, Petitioner cites to the Bederson Declaration testimony

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“describing the similarities between Mann and Numazaki and concluding the modification would have been well within the skill set of a [person of ordinary skill in the art].” *Id.* at 21 (citing Ex. 1003 ¶ 46). Petitioner also cites to legal precedent for the proposition that it is “obvious to use known techniques to improve similar devices in the same way.” *Id.* (citing *KSR Int’l Co. v. Teleflex Inc.*, 550 U.S. 398, 417 (2007)).

Petitioner further explains that Mann includes “the requisite structure to capture gestures (i.e., PDA and wristwatch devices with cameras facing that user), and it expressly describes receiving finger-based input to control the operation of the wristwatch,” while “Numazaki similarly describes PDA and wristwatch devices with cameras facing the user such that a user can perform gestures over the devices to exert control over the operation of the device. *Id.* (citing Ex. 1004, 11–13, 15; Ex. 1005, 52:5–32). Petitioner concludes that “[a] [person of ordinary skill in the art] would have recognized that [the] modif[ication] . . . would have required a straightforward replacement of Mann’s native user-facing imaging with Numazaki’s gesture-recognition hardware” and “a straightforward software update (i.e., adding Numazaki’s gesture detection routines).” *Id.* at 21–22 (citing Ex. 1003 ¶ 46).

Patent Owner argues that Mann’s “single user-facing camera . . . is drastically different than . . . [Numazaki’s] multiple photo-detection units, lighting unit, timing circuitry, and image subtraction circuitry,” and that “Mann’s single user-facing camera is not involved in Mann’s finger-based input control.” Prelim. Resp. 14–15. Thus, Patent Owner concludes “a [person of ordinary skill in the art] could not anticipate a successful combination” based on the similarity highlighted in the Petition. *Id.* at 15.

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We do not read the Petition as equating Mann’s user-facing camera with Numazaki’s gesture based control system. Rather the Petition notes that “the requisite structure” in the form of a “cameras facing th[e] user” is present in Mann, so that the modification is possible based on some of the hardware already being present. Pet. 21. The Petition acknowledges that “Mann’s native user-facing imaging” would need to be replaced by “Numazaki’s gesture-recognition hardware” and “a straightforward software update.” *Id.* at 21–22. The Petition is also supported by declarant testimony stating that “the modification would have been well within the skill set of a [person of ordinary skill in the art].” *Id.* at 21 (citing Ex. 1003 ¶ 46).

Not only does Patent Owner appear to misread the Petition, but Patent Owner’s assertion that “a [person of ordinary skill in the art] could not anticipate a successful combination” is merely unsupported attorney argument based on the current record. *See In re Pearson*, 494 F.2d 1399, 1405 (CCPA 1974) (“Attorney’s argument in a brief cannot take the place of evidence.”). Obviously, a fully developed record may change this analysis.

Based on the above and the current record, we determine that the reason to combine Mann and Numazaki provided in the Petition on this basis is reasonable. Thus, in view of all of the analysis of claim 1 above, we conclude that Petitioner has demonstrated a reasonable likelihood of prevailing with respect to claim 1.

*(b) Less Attention*

Petitioner also argues that “a [person of ordinary skill in the art] would have understood that allowing a user to perform no-touch gestures over the user-facing camera improves the covert nature of Mann’s devices.” Pet. 22 (citing Ex. 1003 ¶ 47). Petitioner argues that “physically touching a . . . [device] in order to trigger a recording runs the risk of being noticed by

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the subject” but that “finger-based no-touch gestures over the user-facing camera . . . would improve the covert nature of these devices” and “would draw much less attention.” *Id.*

Patent Owner correctly notes that “[t]he Petition [and the declarant] fail[] to provide any explanation or reasoning as to why Numazaki’s no-touch gestures would draw ‘much less’ attention than physically interacting with a watch interface or using a stylus on a PDA.” Prelim. Resp. 9–10. We further note that though the Bederson Declaration testimony makes statements similar to those in the Petition, no support is provided for what appear to be conclusory statements. *See* Ex. 1003 ¶ 47. Further, the declarant does not identify any experience or expertise in things of a “covert nature.” *See id.* at App. A (declarant’s resume). Thus, we give the Bederson Declaration testimony little weight on this point.

Patent Owner further argues that physical contact with a wristwatch or PDA was the normal way in which one would have expected someone to interact with such a device at the time of the invention. Prelim. Resp. 9. Patent Owner further argues that “no-touch gesture recognition . . . [is] more likely to intrigue the subject and draw their attention.” *Id.* at 9–10.

On this record, Patent Owner’s arguments appear to have merits. Nevertheless, we do not need to determine whether this additional reason to combine by Petitioner is sufficient in light of our determination regarding the first reason to combine.

Patent Owner is encouraged to resubmit its arguments in the Patent Owner Response. Patent Owner is cautioned that any arguments not raised in the Response may be deemed waived.

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(c) *Obstruct the User's View*

Petitioner argues that “Mann’s native touch-based gesture control would have suffered from” two downsides 1) “obstructing the user’s view of the watch face and PDA display when the user interacts with the device;” and 2) decrease the “fidelity of th[e] camera” because of the contact with the user’s finger “due to grease and grime from the user’s finger (or require regular cleanings).” Pet. 22–24. Petitioner reasons that this is inevitable because the camera and the touch based controls are both on the watch face. *Id.*

In view of these assert downsides, Petitioner argues that “Numazaki provides express motivation to implement Mann’s device with no-touch gesture functionality” because “Numazaki teaches that, by orienting the light and camera windows on the device to capture gestures, ‘it is possible to prevent the operating finger from obstructing the view of the display.’” *Id.* at 22–23 (quoting Ex. 1005, 52:30–32).

Though the Petition implies that this reasoning applies to both the wristwatch and PDA designs (*see id.* at 23 (“obstructing the user’s view of the watch face and PDA display”)), we note that the Petition only provides details with respect to Mann’s wristwatch design (*id.* at 23–24 (discussing Mann Figure 3)).

Patent Owner argues that this reason to combine is insufficient as “Mann . . . suggests that an obstruction to the watch face is of little concern.” Prelim. Resp. 11 (citing Ex. 1004, 15).

Patent Owner also correctly identifies that Mann’s display including the watch face with the touch based controls is separate from and spaced away from the user-facing camera. *Id.* at 12–14. Patent Owner argues that

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this shows that that second downside identified in the Petition is not actually an issue. *Id.*

On this record, Patent Owner's arguments appear to have merits. Nevertheless, we do not need to determine whether this additional reason to combine by Petitioner is sufficient in light of our determination regarding the first reason to combine.

Patent Owner is encouraged to resubmit its arguments in the Patent Owner Response. Patent Owner is cautioned that any arguments not raised in the Response may be deemed waived.

*(3) Conclusion for Claim 1*

For the above reasons, Patent Owner's arguments do not undermine the showing by Petitioner that the combination of Mann and Numazaki teaches all limitations of claim 1 for purposes of this Decision.

*d) Claims 2–6, 11, 14*

Petitioner argues that the combination of Mann and Numazaki renders obvious dependent claims 2–6, 11, and 14. Pet. 42–49. Patent Owner does not contest Petitioner's assertions regarding these claims at this stage. *See generally* Prelim. Resp. We have reviewed Petitioner's assertions and the supporting evidence, and determine that Petitioner has established a reasonable likelihood of prevailing

*5. Obviousness over Mann, Numazaki and Amir or Aviv*

Petitioner argues that the combination of Mann, Numazaki and Amir renders obvious dependent claims 7, 8, 10, 12, and 13. Pet. 49–59. Petitioner argues that the combination of Mann, Numazaki, and Aviv renders obvious dependent claims 6 and 9. *Id.* at 59–65. Patent Owner does not separately address these grounds. *See generally* Prelim. Resp.

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We have reviewed Petitioner's assertions with respect to these claims and the supporting evidence, and determine that Petitioner has established a reasonable likelihood of prevailing.

*C. Jurisdiction over Expired Patents*

Patent Owner argues that the Board does not have jurisdiction over expired patents. Prelim. Resp. 18. Patent Owner argues:

35 U.S.C. § 2(a)(1) states that the United States Patent and Trademark Office “shall be responsible for the granting and issuing of patents. . . .” The Patent Trial Appeal Board is required to “conduct inter partes reviews and post-grant reviews pursuant to chapters 31 and 32.” 35 U.S.C. § 6(b)(4). The burden of proof required to find a claim unpatentable is the preponderance of evidence, which is a lower burden of proof than the clear and convincing standard applied in district courts. 35 U.S.C. § 316(a)(9) requires that the Director prescribe regulations “setting forth standards and procedures for allowing the patent owner to move to amend the patent under subsection(d).” This is due, in part, to the fact that there is a lower burden of proof required before the Board.

*Id.* at 18–19.

Patent Owner appears to be arguing that, because 35 U.S.C. § 316(a)(9) requires the Director to establish procedures to allow for amendments of patents and that as expired patents cannot be amended, we do not have jurisdiction over expired patents in *inter partes* review. *Id.* Patent Owner concludes that as “[t]he ’924 Patent has expired, . . . the opportunity to amend the ’924 Patent is not available to Patent Owner” and therefore “determinations regarding the validity of this expired patent should be reserved for Article III courts under the clear and convincing standard.”

*Id.* at 19.

*Inter partes* review of patents, whether expired or not, fits within the USPTO's mandate “for the granting and issuing of patents” (35 U.S.C.



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§ 2(a)(1)), for as the Supreme Court has stated, “[i]nter partes review is ‘a second look at an earlier administrative grant of a patent’” (*Oil States Energy Servs., LLC v. Greene’s Energy Grp., LLC*, 138 S. Ct. 1365, 1374 (2018) (quoting *Cuozzo Speed Techs., LLC v. Lee*, 136 S. Ct. 2131, 2144 (2016))). Our rules have also made clear *inter partes* review covers expired patents. 37 C.F.R. 42.100(b) (2012); *see also, e.g.*, 83 FR 51341 (Oct. 11, 2018) (Changes to the Claim Construction Standard for Interpreting Claims in Trial Proceedings Before the Patent Trial and Appeal Board)<sup>7</sup> (“The claim construction standard adopted in this final rule also is consistent with the same standard that the Office has applied in interpreting claims of expired patents and soon-to-be expired patents. *See, e.g., Wasica Fin. GmbH v. Cont’l Auto. Sys., Inc.*, 853 F.3d 1272, 1279 (Fed. Cir. 2017) (noting that “[t]he Board construes claims of an expired patent in accordance with *Phillips* . . . [and] [u]nder that standard, words of a claim are generally given their ordinary and customary meaning”).”).

Further, the statutes governing *inter partes* review do not limit them to non-expired patents. For example, 35 U.S.C. § 311(b), which sets forth the scope of *inter partes* review, merely refers to patents with no mention of the expiration date. Further, 35 U.S.C. § 311(c) entitled “Filing Deadline” makes no mention of the expiration date of the patent. Elsewhere, 35 U.S.C. § 315 does limit the filing of IPRs based on civil actions and the serving of complaints, but again makes no mention of the expiration date of the patent. Patent Owner does not identify any statute that expressly limits *inter partes* review to non-expired patents.

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<sup>7</sup> Available at <https://www.federalregister.gov/d/2018-22006/p-13>.

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Patent Owner fails to adequately explain why the requirement to establish procedures to allow for amendments to a patent means that expired patents are not subject to *inter partes* review. For example, the statute does not mandate that amendments to the patent be allowed in all cases.

For all of these reasons, we do not agree that the Board lacks jurisdiction over expired patents.

### III. CONCLUSION

For the foregoing reasons, we have determined that there is a reasonable likelihood that the Petitioner would prevail with respect to at least one of the claims challenged in the Petition. We therefore institute trial as to all challenged claims on all grounds stated in the Petition.

### IV. ORDER

In consideration of the foregoing, it is hereby:

ORDERED that, *inter partes* review of claims 1–14 of U.S. Patent 8,194,924 B2 is instituted on all grounds in the Petition;

FURTHER ORDERED that pursuant to 35 U.S.C. § 314(c) and 37 C.F.R. § 42.4, notice is hereby given of the institution of a trial; the trial will commence on the entry date of this decision.

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